



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/596,831

06/26/2006

Hajime Matsumoto

2008_0999

1087

513 7590 01/11/2011
WENDEROTH, LIND & PONACK, L.L.P.
1030 15th Street, N.W.,
Suite 400 East
Washington, DC 20005-1503

EXAMINER

NGUYEN, KHANH TUAN

ART UNIT

PAPER NUMBER

1766

NOTIFICATION DATE

DELIVERY MODE

01/11/2011

ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

ddalecki@wenderoth.com
coa@wenderoth.com

Advisory Action Before the Filing of an Appeal Brief	Application No.	Applicant(s)	
	10/596,831	MATSUMOTO ET AL.	
	Examiner	Art Unit	
	KHANH T. NGUYEN	1766	

--The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

THE REPLY FILED 27 December 2010 FAILS TO PLACE THIS APPLICATION IN CONDITION FOR ALLOWANCE.

1. ☒ The reply was filed after a final rejection, but prior to or on the same day as filing a Notice of Appeal. To avoid abandonment of this application, applicant must timely file one of the following replies: (1) an amendment, affidavit, or other evidence, which places the application in condition for allowance; (2) a Notice of Appeal (with appeal fee) in compliance with 37 CFR 41.31; or (3) a Request for Continued Examination (RCE) in compliance with 37 CFR 1.114. The reply must be filed within one of the following time periods:

- a) ☒ The period for reply expires 4 months from the mailing date of the final rejection.
- b) ☐ The period for reply expires on: (1) the mailing date of this Advisory Action, or (2) the date set forth in the final rejection, whichever is later. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of the final rejection.

Examiner Note: If box 1 is checked, check either box (a) or (b). ONLY CHECK BOX (b) WHEN THE FIRST REPLY WAS FILED WITHIN TWO MONTHS OF THE FINAL REJECTION. See MPEP 706.07(f).

Extensions of time may be obtained under 37 CFR 1.136(a). The date on which the petition under 37 CFR 1.136(a) and the appropriate extension fee have been filed is the date for purposes of determining the period of extension and the corresponding amount of the fee. The appropriate extension fee under 37 CFR 1.17(a) is calculated from: (1) the expiration date of the shortened statutory period for reply originally set in the final Office action; or (2) as set forth in (b) above, if checked. Any reply received by the Office later than three months after the mailing date of the final rejection, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

NOTICE OF APPEAL

2. ☐ The Notice of Appeal was filed on _____. A brief in compliance with 37 CFR 41.37 must be filed within two months of the date of filing the Notice of Appeal (37 CFR 41.37(a)), or any extension thereof (37 CFR 41.37(e)), to avoid dismissal of the appeal. Since a Notice of Appeal has been filed, any reply must be filed within the time period set forth in 37 CFR 41.37(a).

AMENDMENTS

3. ☐ The proposed amendment(s) filed after a final rejection, but prior to the date of filing a brief, will not be entered because
- (a) ☐ They raise new issues that would require further consideration and/or search (see NOTE below);
- (b) ☐ They raise the issue of new matter (see NOTE below);
- (c) ☐ They are not deemed to place the application in better form for appeal by materially reducing or simplifying the issues for appeal; and/or
- (d) ☐ They present additional claims without canceling a corresponding number of finally rejected claims.

NOTE: _____. (See 37 CFR 1.116 and 41.33(a)).

4. ☐ The amendments are not in compliance with 37 CFR 1.121. See attached Notice of Non-Compliant Amendment (PTOL-324).
5. ☒ Applicant's reply has overcome the following rejection(s): See Continuation Sheet.
6. ☐ Newly proposed or amended claim(s) _____ would be allowable if submitted in a separate, timely filed amendment canceling the non-allowable claim(s).
7. ☒ For purposes of appeal, the proposed amendment(s): a) ☐ will not be entered, or b) ☒ will be entered and an explanation of how the new or amended claims would be rejected is provided below or appended.
- The status of the claim(s) is (or will be) as follows:
- Claim(s) allowed: _____.
- Claim(s) objected to: _____.
- Claim(s) rejected: 1 and 7-9.
- Claim(s) withdrawn from consideration: _____.

AFFIDAVIT OR OTHER EVIDENCE

8. ☐ The affidavit or other evidence filed after a final action, but before or on the date of filing a Notice of Appeal will not be entered because applicant failed to provide a showing of good and sufficient reasons why the affidavit or other evidence is necessary and was not earlier presented. See 37 CFR 1.116(e).
9. ☐ The affidavit or other evidence filed after the date of filing a Notice of Appeal, but prior to the date of filing a brief, will not be entered because the affidavit or other evidence failed to overcome all rejections under appeal and/or appellant fails to provide a showing of a good and sufficient reasons why it is necessary and was not earlier presented. See 37 CFR 41.33(d)(1).
10. ☒ The affidavit or other evidence is entered. An explanation of the status of the claims after entry is below or attached.

REQUEST FOR RECONSIDERATION/OTHER

11. ☒ The request for reconsideration has been considered but does NOT place the application in condition for allowance because: See Continuation Sheet.
12. ☐ Note the attached Information *Disclosure Statement*(s). (PTO/SB/08) Paper No(s). _____
13. ☐ Other: _____.

/Mark Kopec/
Primary Examiner, Art Unit 1761

Continuation of 5. Applicant's reply has overcome the following rejection(s): The rejection of claims 1 and 7-9 under 35 U.S.C. 103(a) as being unpatentable over EP 1548866 A1 (Maruo) in view of either JP 2002-063934 (Takeda) or "Low-melting, Low-viscous, Hydrophobic Ionic Liquids: N-Alkyl(alkyl ether)-N-methylpyrrolidinium Perfluoroethyltrifluoroborate" (Zhou). The rejection of claims 1 and 7-9 under 35 U.S.C. 103(a) as being unpatentable over either U.S. Pub. 2003/0202316 A1 (Kawasato), EP 1380569 A1 (Sato), or EP 1548866 A1 (Maruo) in view of "Low-melting, Low-viscous, Hydrophobic Ionic Liquids: N-Alkyl(alkyl ether)-N-methylpyrrolidinium Perfluoroethyltrifluoroborate" (Zhou).

Continuation of 11. does NOT place the application in condition for allowance because:

Initially, it should be noted that the rejection of claims 1 and 7-9 under 35 U.S.C. 103(a) as being unpatentable over EP 1548866 A1 (Maruo) in view of either JP 2002-063934 (Takeda) or "Low-melting, Low-viscous, Hydrophobic Ionic Liquids: N-Alkyl(alkyl ether)-N-methylpyrrolidinium Perfluoroethyltrifluoroborate" (Zhou) is withdrawn in view of the applicant's remark on connecting page 3-4.

The rejection of claims 1 and 7-9 under 35 U.S.C. 103(a) as being unpatentable over either U.S. Pub. 2003/0202316 A1 (Kawasato), EP 1380569 A1 (Sato), or EP 1548866 A1 (Maruo) in view of "Low-melting, Low-viscous, Hydrophobic Ionic Liquids: N-Alkyl(alkyl ether)-N-methylpyrrolidinium Perfluoroethyltrifluoroborate" (Zhou) is withdrawn in view of the Declaration filed on 12/27/2010.

On pages 2-6 of the remarks, applicant argues that Kawasato (US 2003/020316) and Sato (EP 1380569) are silent about [C2F5BF3]-anion. Further, applicant argues that Takeda (JP 2002-63934) is silent about a pyrrolidinium ion. The applicant refutes prior art references individually, rather than in combination. The court has held that "[n]on-obviousness cannot be established by attacking references individually where the rejection is based upon the teachings of a combination of references. Thus, [prior art reference] must be read, not in isolation, but for what it fairly teaches in combination with the prior art as a whole." See *In re Merck & Co., Inc.*, 231 USPQ 375, 380 (CA FC 1986). In response to applicant's piecemeal analysis of the references, "one cannot show non-obviousness by attacking references individually where, as here, the rejections are based on combinations of references." *In re Keller, Terry, and Davies*, 208 USPQ 871, 882 (CCPA 1981). In the instant case, Kawasato and Sato disclose an electrolytic solution useful in electric double layer comprising of pyrrolidinium ion and quaternary boron salt (See [0032] and Formula 6 of Kawasato; See [0038] and Formula 5 of Sato). In the same field of endeavor, Takeda discloses an electrolytic solution useful in electric double layer that uses [C2F5BF3]-anion in order to decrease the moisture content (See [0003] and Table 1). Clearly, all the claimed elements were known in the prior art and the one skilled in the art could have combined the elements as claimed by the know methods with no change in their respective functions, and the combination would have yielded predictable results to one of ordinary skill in the art at the time of the invention. Moreover, one of ordinary skill would be motivated to pair the claimed anion with an art recognized cation to make an additional ionic liquid with reasonable expectation of success. Based on the above rational, it is believed that a prima facie case of obviousness was presented previously and the claimed limitations are met by the reference submitted. Therefore, the rejection of claims 1 and 7-9 under 35 U.S.C. 103(a) as being unpatentable over either U.S. Pub. 2003/0202316 A1 (Kawasato) or EP 1380569 A1 (Sato) in view of JP 2002-063934 (Takeda) is maintained.